

North Falklands Basin, Assessment Unit 60600101
Assessment Results Summary

[MMBO, million barrels of oil. BCFG, billion cubic feet of gas. MMBNGL, million barrels of natural gas liquids. MFS, minimum field size assessed (MMBO or BCFG). Prob., probability (including both geologic and accessibility probabilities) of at least one field equal to or greater than the MFS. Results shown are fully risked estimates. For gas fields, all liquids are included under the NGL (natural gas liquids) category. F95 represents a 95 percent chance of at least the amount tabulated. Other fractiles are defined similarly. Fractiles are additive under the assumption of perfect positive correlation. Shading indicates not applicable]

Field Type	MFS	Prob. (0-1)	Undiscovered Resources												Largest Undiscovered Field (MMBO or BCFG)			
			Oil (MMBO)				Gas (BCFG)				NGL (MMBNGL)				F95	F50	F5	Mean
			F95	F50	F5	Mean	F95	F50	F5	Mean	F95	F50	F5	Mean				
Oil Fields	10	0.90	0	3,047	9,101	3,603	0	2,936	9,520	3,603	0	57	197	72	148	713	2,681	955
Gas Fields	60						0	4,463	13,227	5,268	0	86	278	105	257	1,077	4,049	1,448
Total		0.90	0	3,047	9,101	3,603	0	7,400	22,747	8,871	0	143	475	178				

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Forecast: Oil in Oil Fields

Summary:

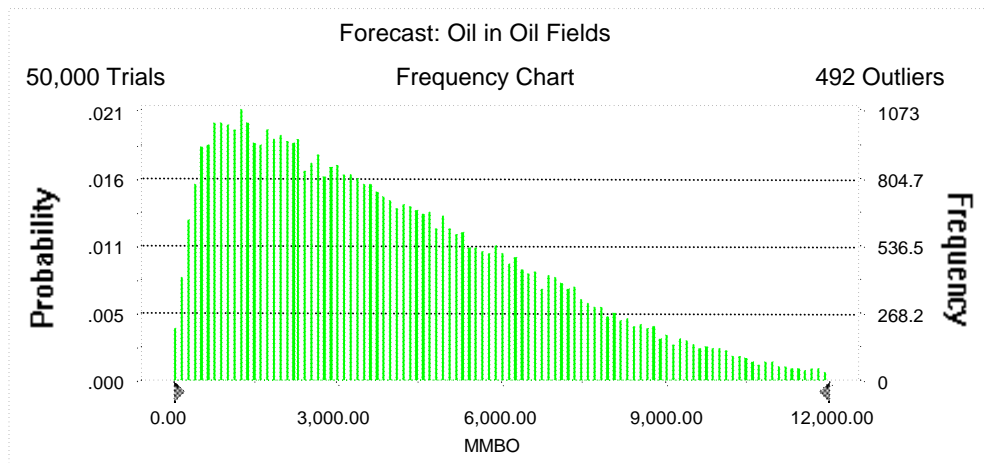
Display range is from 0.00 to 12,000.00 MMBO

Entire range is from 11.34 to 18,255.53 MMBO

After 50,000 trials, the standard error of the mean is 12.45

Statistics:

	<u>Value</u>
Trials	50000
Mean	3,986.62
Median	3,437.45
Mode	---
Standard Deviation	2,784.75
Variance	7,754,821.36
Skewness	0.90
Kurtosis	3.55
Coefficient of Variability	0.70
Range Minimum	11.34
Range Maximum	18,255.53
Range Width	18,244.19
Mean Standard Error	12.45



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Forecast: Oil in Oil Fields (cont'd)

Percentiles:

<u>Percentile</u>	<u>MMBO</u>
100%	11.34
95%	539.14
90%	847.01
85%	1,146.50
80%	1,432.54
75%	1,749.02
70%	2,054.37
65%	2,369.48
60%	2,715.45
55%	3,071.19
50%	3,437.45
45%	3,825.01
40%	4,248.54
35%	4,689.50
30%	5,164.51
25%	5,704.77
20%	6,313.60
15%	7,013.75
10%	7,893.05
5%	9,297.40
0%	18,255.53

End of Forecast

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Forecast: Gas in Oil Fields

Summary:

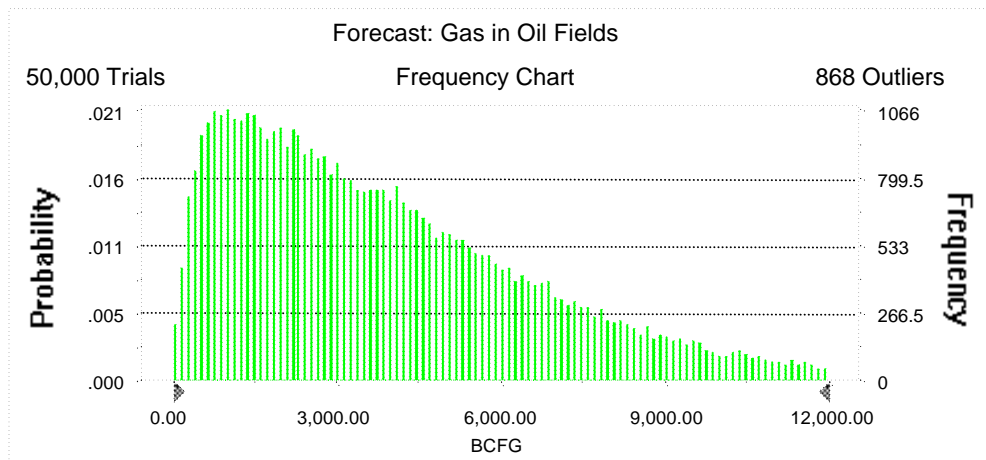
Display range is from 0.00 to 12,000.00 BCFG

Entire range is from 10.31 to 22,453.20 BCFG

After 50,000 trials, the standard error of the mean is 13.23

Statistics:

	<u>Value</u>
Trials	50000
Mean	3,987.55
Median	3,334.71
Mode	---
Standard Deviation	2,958.86
Variance	8,754,848.33
Skewness	1.15
Kurtosis	4.45
Coefficient of Variability	0.74
Range Minimum	10.31
Range Maximum	22,453.20
Range Width	22,442.88
Mean Standard Error	13.23



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Forecast: Gas in Oil Fields (cont'd)

Percentiles:

<u>Percentile</u>	<u>BCFG</u>
100%	10.31
95%	512.69
90%	805.77
85%	1,091.72
80%	1,385.84
75%	1,674.30
70%	1,982.46
65%	2,292.39
60%	2,619.23
55%	2,960.36
50%	3,334.71
45%	3,732.59
40%	4,134.87
35%	4,568.51
30%	5,064.44
25%	5,615.52
20%	6,256.07
15%	7,037.38
10%	8,081.35
5%	9,719.99
0%	22,453.20

End of Forecast

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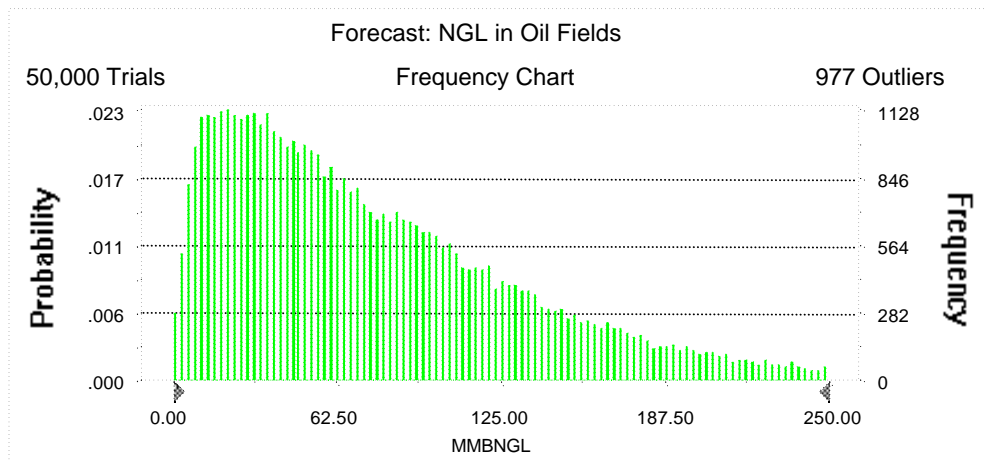
Forecast: NGL in Oil Fields

Summary:

Display range is from 0.00 to 250.00 MMBNGL
Entire range is from 0.21 to 539.45 MMBNGL
After 50,000 trials, the standard error of the mean is 0.28

Statistics:

	<u>Value</u>
Trials	50000
Mean	79.77
Median	64.46
Mode	---
Standard Deviation	62.46
Variance	3,901.65
Skewness	1.37
Kurtosis	5.51
Coefficient of Variability	0.78
Range Minimum	0.21
Range Maximum	539.45
Range Width	539.24
Mean Standard Error	0.28



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Forecast: NGL in Oil Fields (cont'd)

Percentiles:

<u>Percentile</u>	<u>MMBNGL</u>
100%	0.21
95%	9.74
90%	15.42
85%	20.95
80%	26.67
75%	32.28
70%	38.01
65%	44.16
60%	50.60
55%	57.08
50%	64.46
45%	72.16
40%	81.01
35%	90.17
30%	99.97
25%	111.24
20%	124.95
15%	141.37
10%	164.93
5%	201.86
0%	539.45

End of Forecast

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Forecast: Largest Oil Field

Summary:

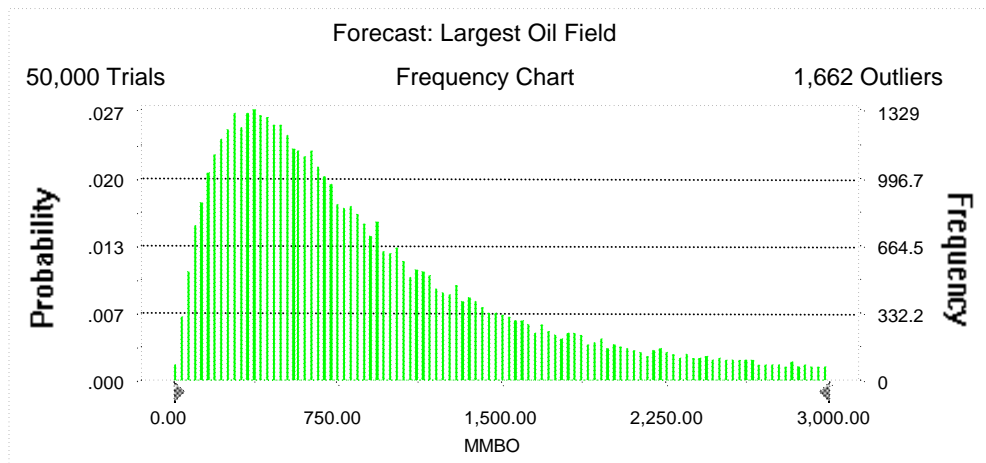
Display range is from 0.00 to 3,000.00 MMBO

Entire range is from 11.34 to 3,999.70 MMBO

After 50,000 trials, the standard error of the mean is 3.51

Statistics:

	<u>Value</u>
Trials	50000
Mean	954.65
Median	712.51
Mode	---
Standard Deviation	784.61
Variance	615,615.30
Skewness	1.49
Kurtosis	5.02
Coefficient of Variability	0.82
Range Minimum	11.34
Range Maximum	3,999.70
Range Width	3,988.37
Mean Standard Error	3.51



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Forecast: Largest Oil Field (cont'd)

Percentiles:

<u>Percentile</u>	<u>MMBO</u>
100%	11.34
95%	147.71
90%	217.48
85%	278.27
80%	336.94
75%	393.43
70%	451.27
65%	511.01
60%	575.04
55%	641.71
50%	712.51
45%	794.51
40%	884.77
35%	990.17
30%	1,116.25
25%	1,268.36
20%	1,455.15
15%	1,708.22
10%	2,069.07
5%	2,681.14
0%	3,999.70

End of Forecast

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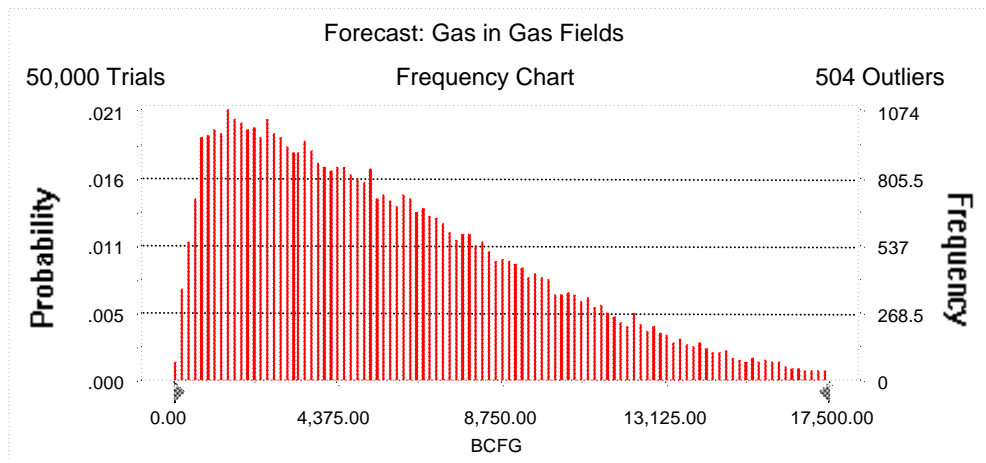
Forecast: Gas in Gas Fields

Summary:

Display range is from 0.00 to 17,500.00 BCFG
Entire range is from 63.17 to 30,842.58 BCFG
After 50,000 trials, the standard error of the mean is 18.13

Statistics:

	<u>Value</u>
Trials	50000
Mean	5,828.76
Median	5,029.00
Mode	---
Standard Deviation	4,052.89
Variance	16,425,887.78
Skewness	0.94
Kurtosis	3.69
Coefficient of Variability	0.70
Range Minimum	63.17
Range Maximum	30,842.58
Range Width	30,779.41
Mean Standard Error	18.13



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Forecast: Gas in Gas Fields (cont'd)

Percentiles:

<u>Percentile</u>	<u>BCFG</u>
100%	63.17
95%	840.45
90%	1,289.74
85%	1,704.15
80%	2,142.49
75%	2,574.76
70%	3,017.33
65%	3,502.15
60%	3,976.48
55%	4,494.59
50%	5,029.00
45%	5,579.86
40%	6,187.45
35%	6,815.37
30%	7,501.56
25%	8,272.08
20%	9,162.80
15%	10,198.73
10%	11,542.99
5%	13,549.89
0%	30,842.58

End of Forecast

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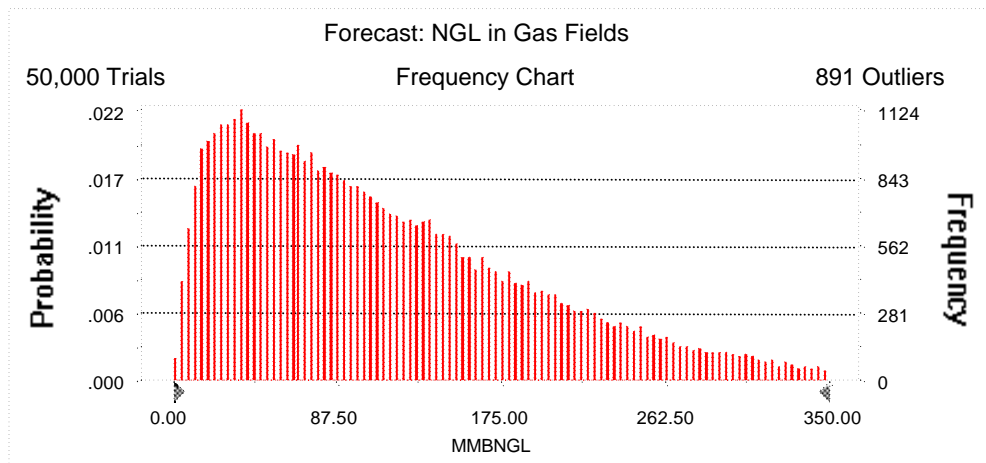
Forecast: NGL in Gas Fields

Summary:

Display range is from 0.00 to 350.00 MMBNGL
Entire range is from 1.16 to 738.47 MMBNGL
After 50,000 trials, the standard error of the mean is 0.39

Statistics:

	<u>Value</u>
Trials	50000
Mean	116.69
Median	97.06
Mode	---
Standard Deviation	86.31
Variance	7,448.66
Skewness	1.18
Kurtosis	4.65
Coefficient of Variability	0.74
Range Minimum	1.16
Range Maximum	738.47
Range Width	737.31
Mean Standard Error	0.39



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Forecast: NGL in Gas Fields (cont'd)

Percentiles:

<u>Percentile</u>	<u>MMBNGL</u>
100%	1.16
95%	16.08
90%	24.71
85%	32.86
80%	40.83
75%	49.28
70%	58.25
65%	67.40
60%	76.69
55%	86.63
50%	97.06
45%	108.10
40%	120.39
35%	133.63
30%	147.45
25%	163.76
20%	182.84
15%	205.84
10%	236.22
5%	284.86
0%	738.47

End of Forecast

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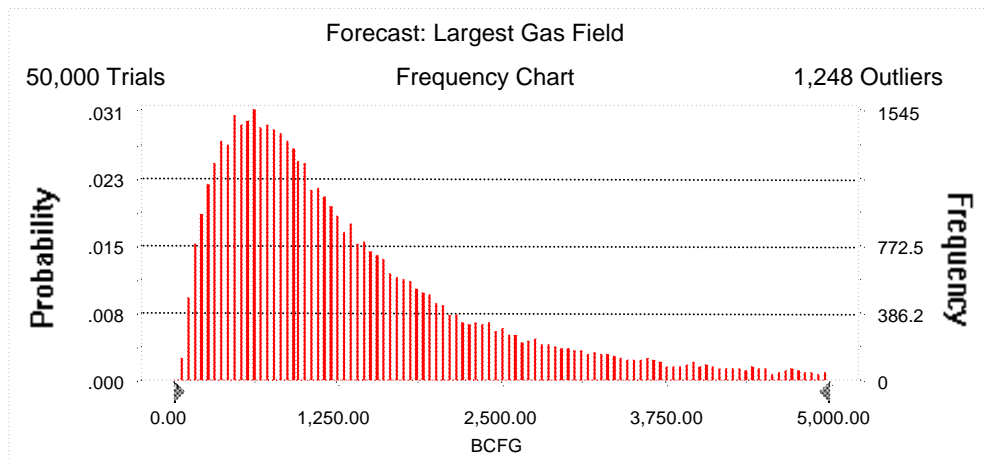
Forecast: Largest Gas Field

Summary:

Display range is from 0.00 to 5,000.00 BCFG
Entire range is from 63.17 to 6,998.29 BCFG
After 50,000 trials, the standard error of the mean is 5.41

Statistics:

	<u>Value</u>
Trials	50000
Mean	1,447.88
Median	1,077.34
Mode	---
Standard Deviation	1,209.76
Variance	1,463,530.40
Skewness	1.79
Kurtosis	6.54
Coefficient of Variability	0.84
Range Minimum	63.17
Range Maximum	6,998.29
Range Width	6,935.12
Mean Standard Error	5.41



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Forecast: Largest Gas Field (cont'd)

Percentiles:

<u>Percentile</u>	<u>BCFG</u>
100%	63.17
95%	257.45
90%	360.59
85%	452.53
80%	536.53
75%	619.71
70%	703.97
65%	789.54
60%	880.54
55%	972.91
50%	1,077.34
45%	1,193.86
40%	1,324.89
35%	1,474.05
30%	1,646.92
25%	1,859.76
20%	2,126.94
15%	2,501.70
10%	3,049.42
5%	4,048.52
0%	6,998.29

End of Forecast

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Forecast: G-Risk Oil in Oil Fields

Summary:

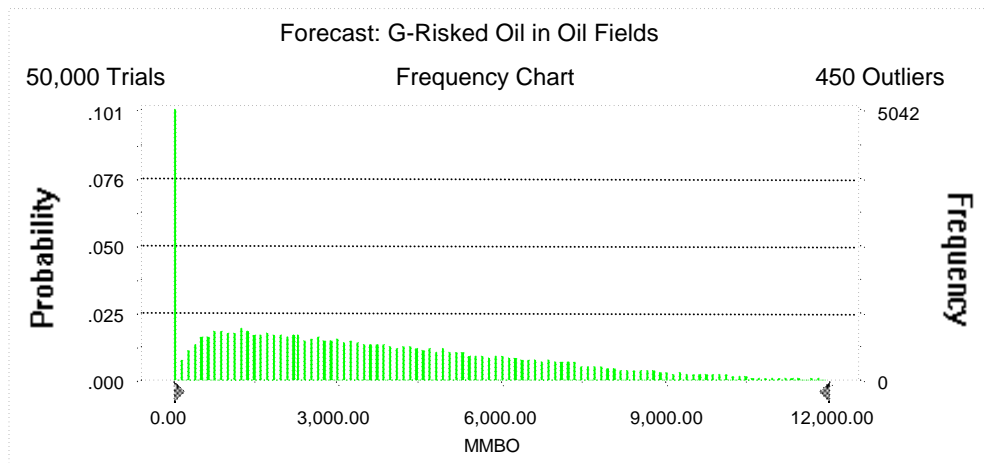
Display range is from 0.00 to 12,000.00 MMBO

Entire range is from 0.00 to 17,286.44 MMBO

After 50,000 trials, the standard error of the mean is 12.97

Statistics:

	<u>Value</u>
Trials	50000
Mean	3,603.34
Median	3,047.40
Mode	0.00
Standard Deviation	2,901.12
Variance	8,416,495.25
Skewness	0.87
Kurtosis	3.43
Coefficient of Variability	0.81
Range Minimum	0.00
Range Maximum	17,286.44
Range Width	17,286.44
Mean Standard Error	12.97



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Forecast: G-Risk Oil in Oil Fields (cont'd)

Percentiles:

<u>Percentile</u>	<u>MMBO</u>
100%	0.00
95%	0.00
90%	102.65
85%	597.50
80%	932.93
75%	1,262.23
70%	1,587.81
65%	1,933.49
60%	2,286.23
55%	2,655.54
50%	3,047.40
45%	3,448.09
40%	3,882.51
35%	4,355.15
30%	4,857.45
25%	5,401.34
20%	6,058.18
15%	6,787.74
10%	7,686.44
5%	9,100.78
0%	17,286.44

End of Forecast

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Forecast: G-Risk Gas in Oil Fields

Summary:

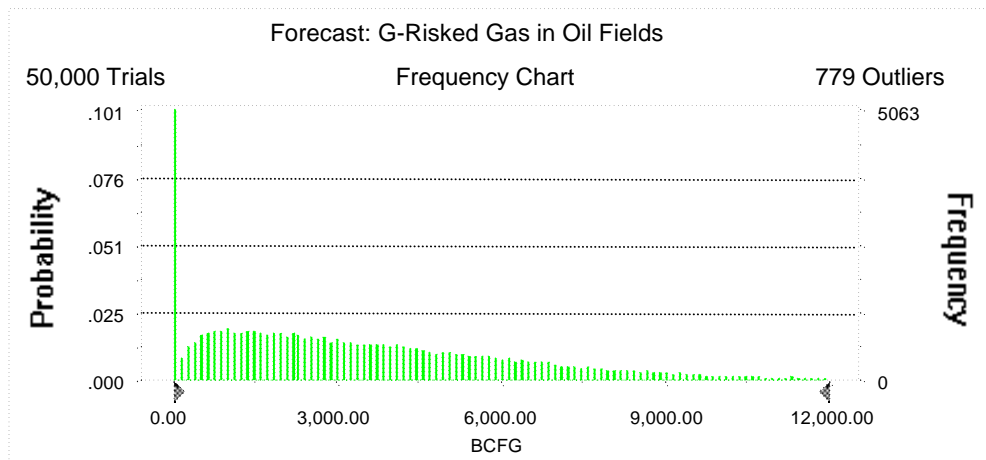
Display range is from 0.00 to 12,000.00 BCFG

Entire range is from 0.00 to 22,453.20 BCFG

After 50,000 trials, the standard error of the mean is 13.64

Statistics:

	<u>Value</u>
Trials	50000
Mean	3,603.41
Median	2,936.28
Mode	0.00
Standard Deviation	3,049.94
Variance	9,302,133.21
Skewness	1.11
Kurtosis	4.29
Coefficient of Variability	0.85
Range Minimum	0.00
Range Maximum	22,453.20
Range Width	22,453.20
Mean Standard Error	13.64



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Forecast: G-Risk Gas in Oil Fields (cont'd)

Percentiles:

<u>Percentile</u>	<u>BCFG</u>
100%	0.00
95%	0.00
90%	96.91
85%	569.06
80%	890.40
75%	1,208.42
70%	1,525.15
65%	1,865.44
60%	2,205.70
55%	2,563.63
50%	2,936.28
45%	3,347.97
40%	3,787.45
35%	4,236.38
30%	4,732.52
25%	5,320.79
20%	5,983.51
15%	6,781.74
10%	7,837.50
5%	9,520.31
0%	22,453.20

End of Forecast

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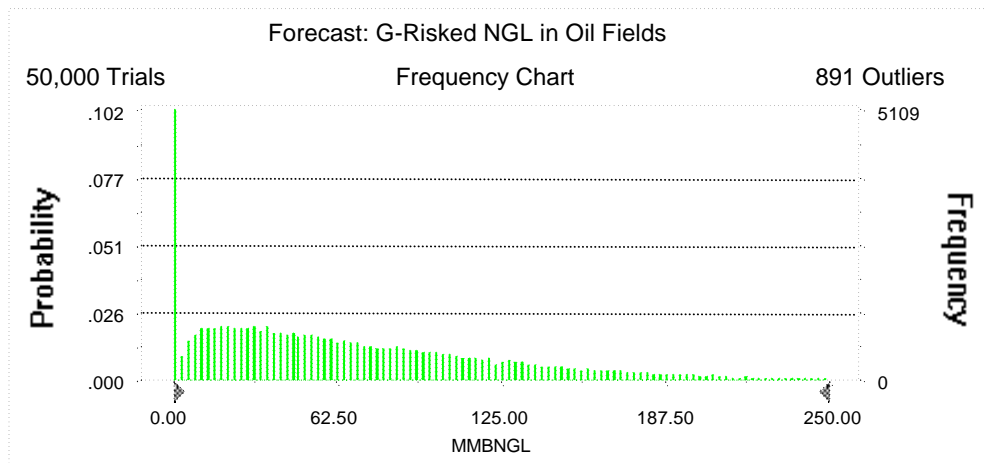
Forecast: G-Riskd NGL in Oil Fields

Summary:

Display range is from 0.00 to 250.00 MMBNGL
Entire range is from 0.00 to 539.45 MMBNGL
After 50,000 trials, the standard error of the mean is 0.29

Statistics:

	<u>Value</u>
Trials	50000
Mean	72.10
Median	56.63
Mode	0.00
Standard Deviation	63.95
Variance	4,090.07
Skewness	1.34
Kurtosis	5.39
Coefficient of Variability	0.89
Range Minimum	0.00
Range Maximum	539.45
Range Width	539.45
Mean Standard Error	0.29



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Forecast: G-Riskied NGL in Oil Fields (cont'd)

Percentiles:

<u>Percentile</u>	<u>MMBNGL</u>
100%	0.00
95%	0.00
90%	1.80
85%	10.77
80%	17.06
75%	23.19
70%	29.53
65%	35.79
60%	42.41
55%	49.53
50%	56.63
45%	64.72
40%	73.37
35%	83.26
30%	93.60
25%	105.14
20%	118.92
15%	135.82
10%	159.31
5%	196.55
0%	539.45

End of Forecast

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Forecast: G-Risk Gas in Gas Fields

Summary:

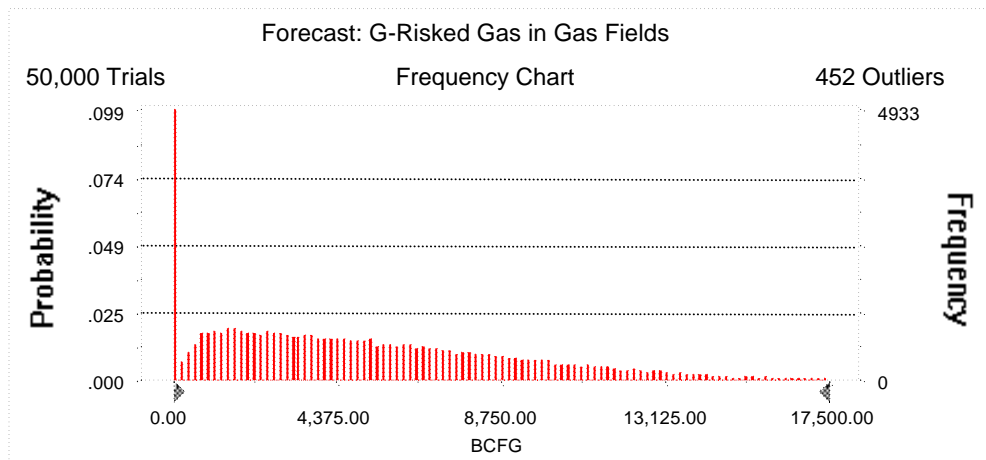
Display range is from 0.00 to 17,500.00 BCFG

Entire range is from 0.00 to 30,842.58 BCFG

After 50,000 trials, the standard error of the mean is 18.88

Statistics:

	<u>Value</u>
Trials	50000
Mean	5,267.70
Median	4,463.40
Mode	0.00
Standard Deviation	4,220.72
Variance	17,814,483.19
Skewness	0.89
Kurtosis	3.56
Coefficient of Variability	0.80
Range Minimum	0.00
Range Maximum	30,842.58
Range Width	30,842.58
Mean Standard Error	18.88



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Forecast: G-Risk Gas in Gas Fields (cont'd)

Percentiles:

<u>Percentile</u>	<u>BCFG</u>
100%	0.00
95%	0.00
90%	217.91
85%	914.37
80%	1,408.04
75%	1,865.50
70%	2,356.79
65%	2,848.43
60%	3,370.19
55%	3,895.75
50%	4,463.40
45%	5,052.37
40%	5,681.04
35%	6,345.99
30%	7,060.46
25%	7,868.52
20%	8,773.40
15%	9,852.02
10%	11,229.52
5%	13,227.05
0%	30,842.58

End of Forecast

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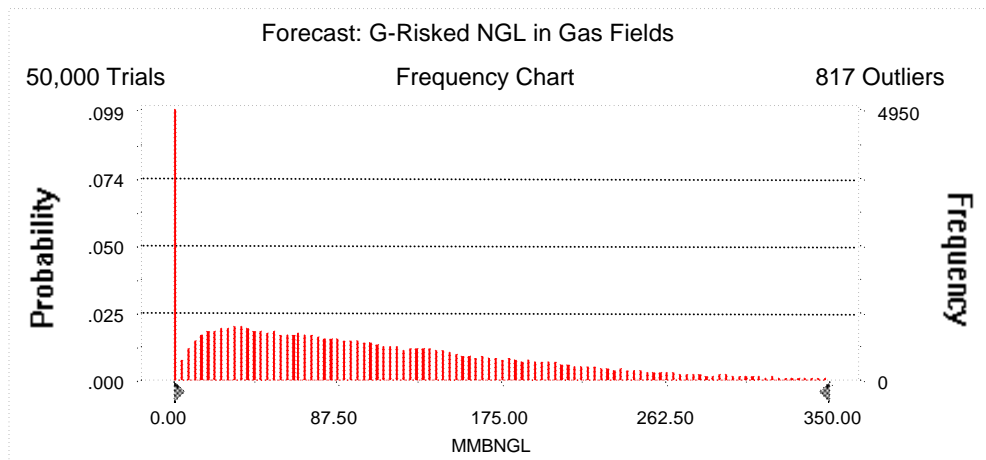
Forecast: G-Riskd NGL in Gas Fields

Summary:

Display range is from 0.00 to 350.00 MMBNGL
Entire range is from 0.00 to 738.47 MMBNGL
After 50,000 trials, the standard error of the mean is 0.40

Statistics:

	<u>Value</u>
Trials	50000
Mean	105.47
Median	86.01
Mode	0.00
Standard Deviation	89.13
Variance	7,943.76
Skewness	1.14
Kurtosis	4.50
Coefficient of Variability	0.85
Range Minimum	0.00
Range Maximum	738.47
Range Width	738.47
Mean Standard Error	0.40



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Forecast: G-Riskied NGL in Gas Fields (cont'd)

Percentiles:

<u>Percentile</u>	<u>MMBNGL</u>
100%	0.00
95%	0.00
90%	4.12
85%	17.47
80%	26.98
75%	35.95
70%	45.07
65%	54.63
60%	64.94
55%	75.06
50%	86.01
45%	97.54
40%	109.85
35%	123.63
30%	138.29
25%	154.62
20%	174.44
15%	198.23
10%	228.54
5%	278.03
0%	738.47

End of Forecast

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Assumptions

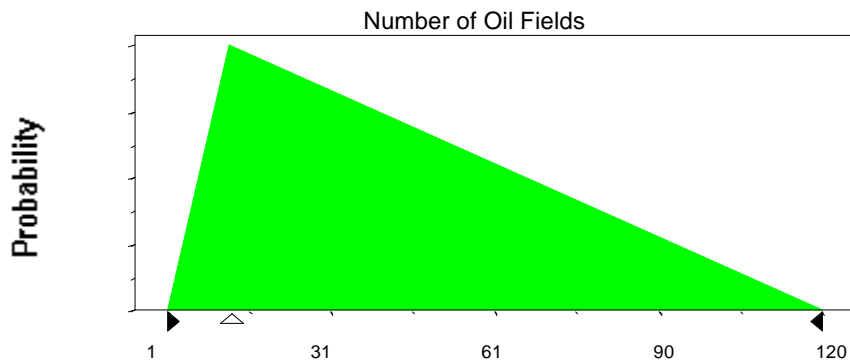
Assumption: Number of Oil Fields

Triangular distribution with parameters:

Minimum	1
Likeliest	12
Maximum	120

Selected range is from 1 to 120

Mean value in simulation was 45



Assumption: Sizes of Oil Fields

Lognormal distribution with parameters:

Mean	86.87
Standard Deviation	367.16

Shifted parameters

96.87
367.16

Selected range is from 0.00 to 3,990.00

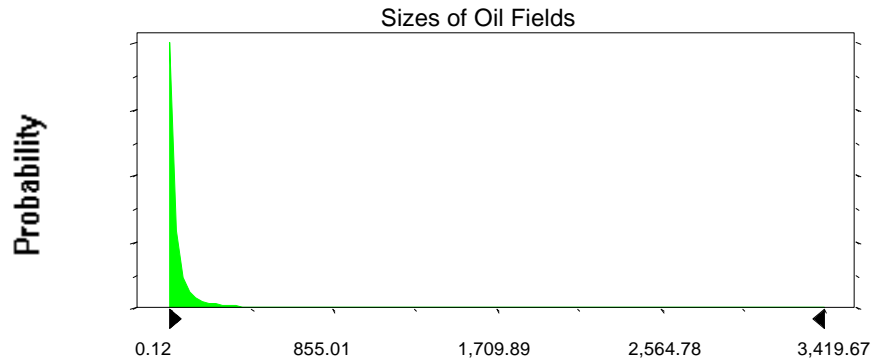
10.00 to 4,000.00

Mean value in simulation was 81.60

91.6

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Assumption: Sizes of Oil Fields (cont'd)



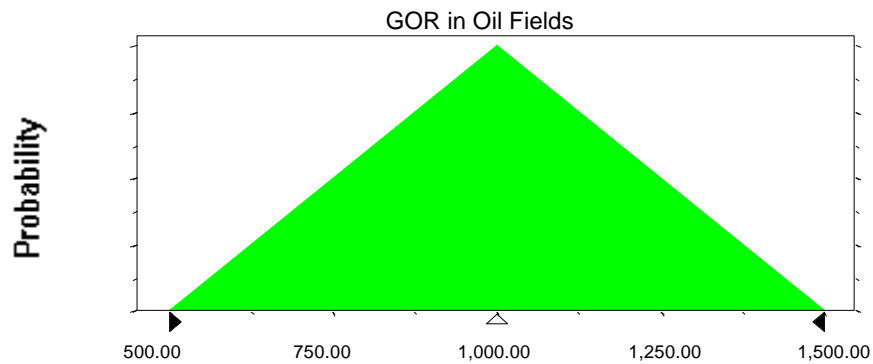
Assumption: GOR in Oil Fields

Triangular distribution with parameters:

Minimum	500.00
Likeliest	1,000.00
Maximum	1,500.00

Selected range is from 500.00 to 1,500.00

Mean value in simulation was 1,000.32



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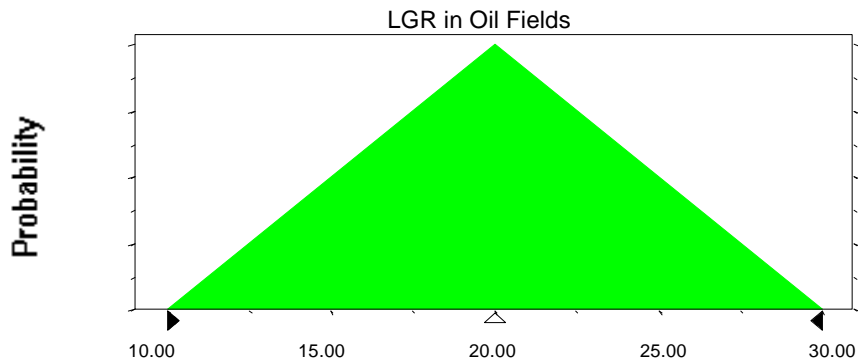
Assumption: LGR in Oil Fields

Triangular distribution with parameters:

Minimum	10.00
Likeliest	20.00
Maximum	30.00

Selected range is from 10.00 to 30.00

Mean value in simulation was 20.02



Assumption: Number of Gas Fields

Triangular distribution with parameters:

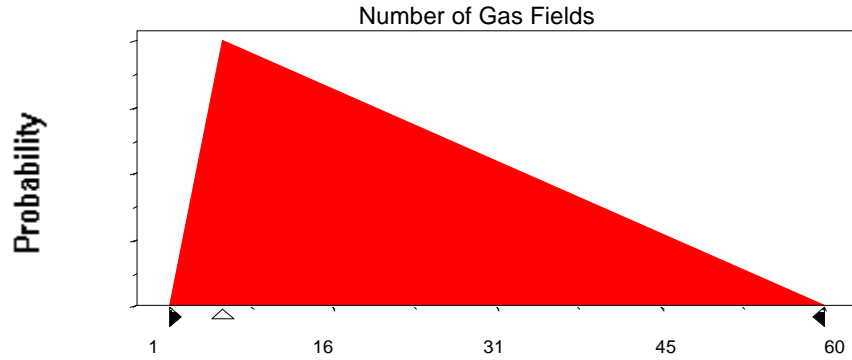
Minimum	1
Likeliest	6
Maximum	60

Selected range is from 1 to 60

Mean value in simulation was 22

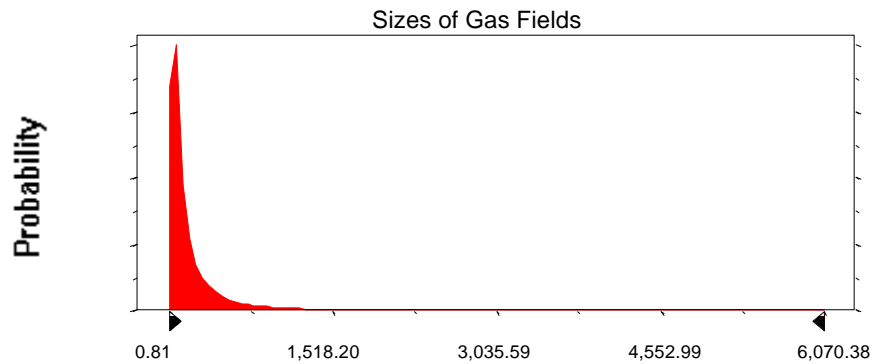
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Assumption: Number of Gas Fields (cont'd)



Assumption: Sizes of Gas Fields

Lognormal distribution with parameters:		Shifted parameters
Mean	211.65	271.65
Standard Deviation	603.90	603.9
Selected range is from 0.00 to 6,940.00		60.00 to 7,000.00
Mean value in simulation was 202.02		262.02



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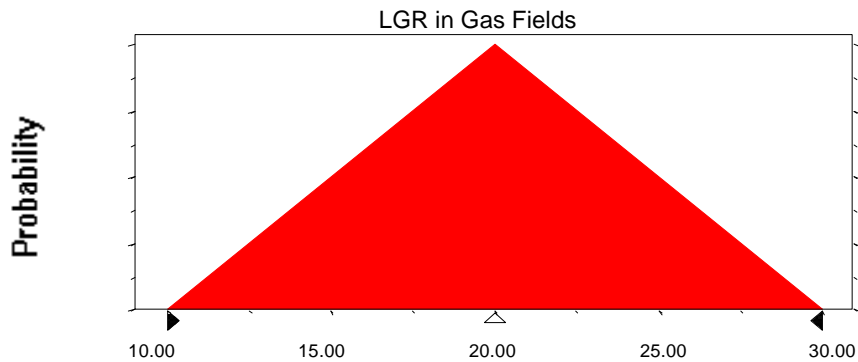
Assumption: LGR in Gas Fields

Triangular distribution with parameters:

Minimum	10.00
Likeliest	20.00
Maximum	30.00

Selected range is from 10.00 to 30.00

Mean value in simulation was 20.01



End of Assumptions

Simulation started on 10/15/99 at 11:54:19

Simulation stopped on 10/15/99 at 12:39:09